Discard Reduction for the Snapper Grouper Fishery

Discussion Document

December 2021

Background

Discards have impacted recent stock assessments and management for the South Atlantic snapper grouper fishery. In some cases (e.g. red snapper), removals due to discarding have comprised a significant percentage of total (discarded plus landed) removals. Large numbers of discards affect managers' ability to prevent overfishing, as well as the number of fish that can be landed by the fishery. Overfishing occurs if the number of total removals exceeds the overfishing limit. If more of these removals occur as fish that die after release, fewer fish may be landed.

In April 2021, the South Atlantic Fishery Management Council's (Council) Snapper Grouper Advisory Panel (AP) recommended several changes to management measures that could impact the number of discards and the survival of released fish in the South Atlantic snapper grouper fishery. These changes included gear modifications and seasons for specific areas or bottom types. The Council reviewed the AP's recommendations, as well as other information on discards within the fishery (discard estimates and mortality rates from recent snapper grouper assessments), and directed staff to begin working on a framework amendment that would incorporate the AP's recommendations for reducing discard removals in the fishery as well as consider a slot limit to reduce discards of red snapper, specifically.

As the first step in development of this framework amendment, the Snapper Grouper Advisory Panel responded to clarifying questions about the proposed actions. Responses to these questions will be supplemented with preliminary analyses and information from stock assessments, past Council visioning efforts, previous similar amendments, and Fishery Performance Reports, to provide the Council a summary of current information prior to option development.

Preliminary Analyses

Recreational

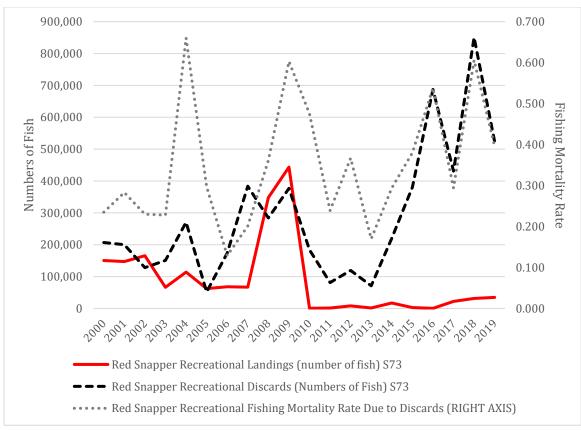


Figure 1. Recreational Red Snapper MRIP FES landings, discards, and fishing mortality rate due to discards (SEDAR 73).

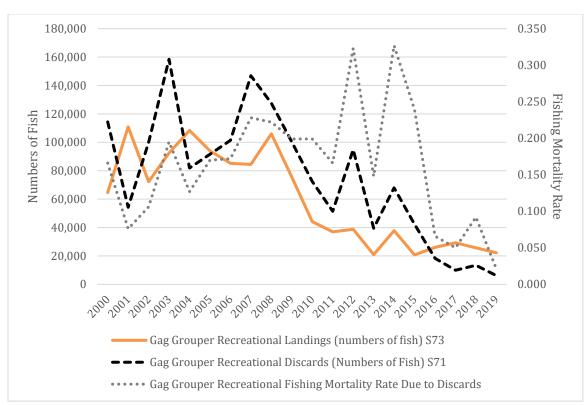


Figure 2. Recreational Gag Grouper MRIP FES landings, discards, and fishing mortality rate due to discards (SEDAR 71).

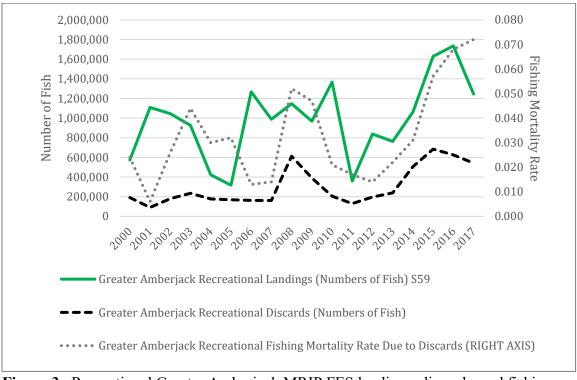


Figure 3. Recreational Greater Amberjack MRIP FES landings, discards, and fishing mortality rate due to discards (SEDAR 59).

Commercial

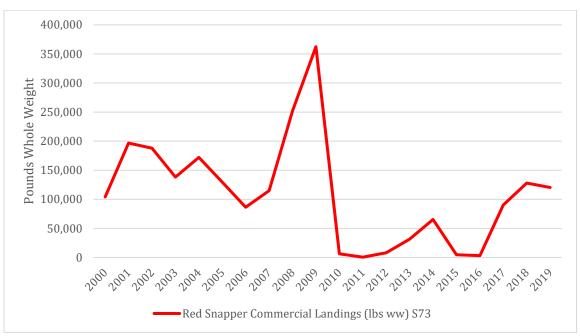


Figure 4a. Commercial Red Snapper landings (SEDAR 73).

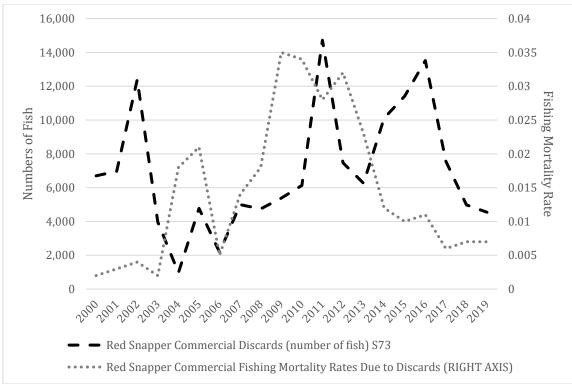


Figure 4b. Commercial Red Snapper discards, and fishing mortality rate due to discards (SEDAR 73).

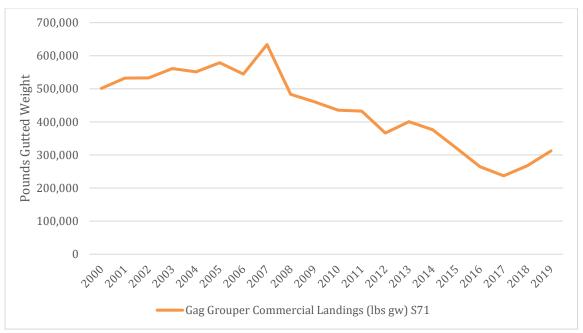


Figure 5a. Commercial Gag Grouper landings (SEDAR 71).

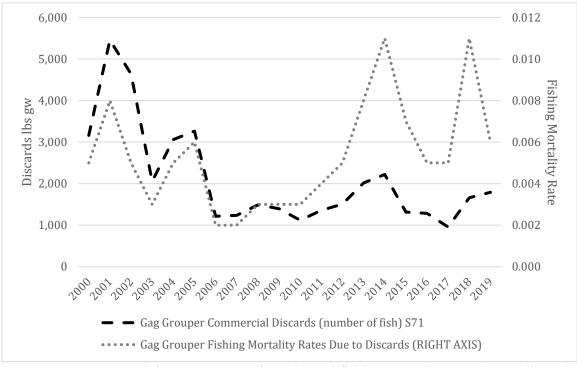


Figure 5b. Commercial Gag Grouper discards, and fishing mortality rate due to discards (SEDAR 71).



Figure 6a. Commercial Greater Amberjack landings (SEDAR 59).

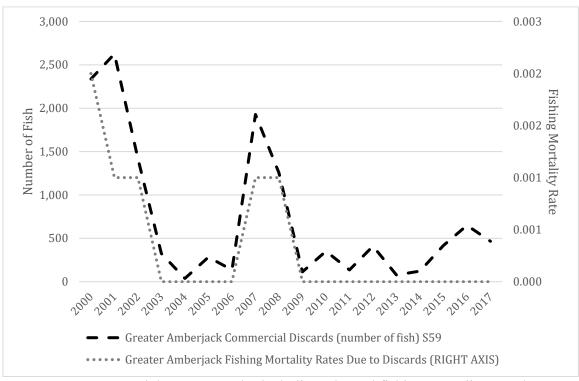


Figure 6b. Commercial Greater Amberjack discards, and fishing mortality rate due to discards (SEDAR 59).

Potential Options

1. Gear modifications

- April 2021 AP recommendations:
 - Single hook rigs
 - Previous South Atlantic amendments/initiatives/discussions
 - Amendment 43 (2018): Considered requiring the use of single hook rigs to reduce the number of discarded fish.
 - Larger hooks
 - Previous South Atlantic amendments/initiatives/discussions
 - **Dolphin Wahoo Amendment 10 (2022):** Action developed but removed that considered minimum hook size requirements in the commercial longline fishery.
 - Leader modifications
 - Relevant amendments under development or paused
 - North Carolina state-based specifications for maximum leader length (space between sinker and hook) when targeting adult red drum.
 - Natural bait prohibition
- Other gear modifications that could reduce discards or improve release survivorship
 - o Previous South Atlantic amendments/initiatives/discussions
 - Amendment 4 (1991): No retention of snapper grouper species caught in other fisheries with gear prohibited in the snapper grouper fishery.
 - Amendment 9 (2006): Black sea bass pots required to have an escape vent and degradable fasteners.
 - Amendment 16 (2009): required a dehooking tool on board when commercially or recreationally snapper grouper fishing.
 - Amendment 17A (2010): required the use of non-stainless-steel circle hooks when using natural baits north of 28 degrees N. Latitude.
 - Amendment 29 (2019): Required the use of non-offset, non-stainless-steel circle hooks when using natural baits north of 28 degrees N. Latitude. Also required a descending device on board when commercially or recreationally snapper grouper fishing.
 - AP discussion of this amendment included a recommendation that descending device usage and release treatment be evaluated, including compliance rates and the type of device used.
 - o Relevant amendments under development or paused.
- Multispecies management from Pacific Fishery Management Council (Groundfish FMP) (https://www.ecfr.gov/current/title-50/chapter-VI/part-660/subpart-G)
 - o Gear restrictions:
 - Off California: 1 line and 2 hooks for recreational rockfish, cabezon, greenling (RCG) complex, lingcod, and scorpionfish.

South Atlantic Sna	apper Grouper	8	Discussion Document					
	bait.	rect), length of fales (53 h	iches), and no natural					
•	Off Oregon, long-leader (Holloway) gear has specified length of line betwee sinker and lowest hook (≥30 feet), length of lures (≤5 inches), and no natural							

2. Spatial/timed seasonal openings

- October 2021 Snapper Grouper AP Discussions:
 - The Snapper Grouper AP discussed the possibility of marine protected areas (MPA) in known spawning aggregation sites to improve gag grouper recruitment (October 2021).
 - o The Snapper Grouper AP also discussed shallow water MPAs to encourage growth of red snapper and gag grouper populations.
 - These MPAs could be considered with a sunset provision that would allow fishing in the future, after the stocks have rebuilt.
 - Methods to estimate and evaluate effectiveness of MPAs in accomplishing management goals should be developed prior to implementation of MPAs.
 - There is a great amount of diversity in the snapper grouper fishery, with different species depending on factors including distance from shore, water depth, location within the water column, etc. The diversity of species and the fishery should be considered in any area seasons or other fishery-wide measures considered.
- Previous South Atlantic amendments/initiatives/discussions
 - Amendment 14 (effective 2009): Established eight deepwater Type II marine protected areas (MPAs) to protect a portion of the population and habitat of longlived deepwater snapper grouper species.
 - Potentially relevant discussions in public hearing minutes.
 - Amendment 16 (effective 2009): Established a four month (January through April) spawning season closure for shallow water grouper where commercial and recreational harvest of these species is prohibited.
 - Also established a recreational harvest closure of vermilion snapper from November through March.
 - o Amendment 17A (effective 2011): Closed area to commercial and recreational fishing for, harvest, and possession of all snapper grouper species.
 - Closed an area from approximately Cumberland Island, GA through Melbourne, FL in depths from 98 feet (30 meters) to 240 feet (73 meters deep).
 - Covered 4,827 square miles.
 - Exemptions to allow for harvest snapper grouper species (other than red snapper) in closed areas harvest with black sea bass pots or spearfishing gear.
 - Included transit provision through closed areas.
 - Other alternatives considered closing areas between approximately Murrells Inlet, SC and Melbourne, FL to snapper grouper fishing. Based on depth or commercial logbook grids.
 - Removed via Regulatory Amendment 10 (effective 2011).
 - o Amendment 17B (effective 2011): Prohibited all fishing for, possession of, and retention of speckled hind and warsaw grouper in the South Atlantic region.
 - Also prohibited fishing for, possession of, and retention of other deepwater snapper grouper species (snowy grouper, blueline tilefish, yellowedge grouper, misty grouper, queen snapper, and silk snapper) beyond a depth of 240 feet (73 meters).

- Removed via Regulatory Amendment 11 (effective 2012).
- Amendment 36 (effective 2017): Established SMZs to enhance protection for snapper-grouper species in spawning condition including speckled hind and warsaw grouper.
 - Potentially relevant discussions in public hearing minutes.
- o Amendment 43 (2018): Considered an action that would establish year round and seasonally closed areas to reduce red snapper bycatch and mortality based on:
 - Depth
 - Red snapper abundance
 - Fishery dependent and independent sources
 - Red snapper discards
 - See Diagram in Appendix 1
 - Broke amendment up into several amendments (Amendment 43: Red Snapper ACLs; Regulatory Amendment 33: Red Snapper Fishing Seasons; Regulatory Amendment 29: Gear Requirements, Amendment 46: Recreational Permit and Reporting (work suspended)
- Regulatory Amendment 30 (2020): Extended the spawning season closure for red grouper to cover the month of May in the EEZ off North Carolina and South Carolina.
- Relevant amendments under development or paused
 - o Snapper Grouper Vision Blueprint
 - Goal 2: Management
 - Suggested consideration of species or area specific quota-based management on a state by state or sub-regional basis.
 - Region or state specific landings limits and quota.
 - Region or state specific opening and closing.
 - Consider setting fishing seasons for co-occurring species.
 - Set aggregate bag limits that support participation in the fishery.
 - Consider number of days allowed to fish.
- Multi species management from Pacific Fishery Management Council (Groundfish FMP) (https://www.ecfr.gov/current/title-50/chapter-VI/part-660/subpart-G)
 - o California recreational RCG complex, lingcod, scorpionfish:
 - 4-5 management areas defined by latitudinal and longitudinal boundaries with different season start times based on species/complex and area
 - Season start dates range from January-May and all seasons end Dec 31
 - Washington
 - Recreational fishery for all groundfish species occurs between mid-March and mid-October.
 - Exceptions allow/prohibit harvest during the open season based on species/complex, depth, area, whether halibut fishery is open, whether halibut are onboard, and dates within the overall season.

TABLE 1 TO PARAGRAPH ((C)(1)(I)(D)—WASHINGTON RECREATIONAL FISHING SEASON STRUCTURE

Marine Area	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
3 and 4 (North Coast)	C	losed	(Open		<20 fm . uly 31 ^a		C	pen		Close	ed
2 (South Coast)	C	losed		Open ^{c/d/}		Open ^{d/}				Closed		
1 (Columbia River)	C	losed		Open ^{e/ f/}						Closed		

a/ Retention of Pacific cod, sablefish, lingcod, bocaccio, silvergray rockfish, canary rockfish, widow rockfish, and yellowtail rockfish allowed >20 fm on days when recreational Pacific halibut is open. b/ Retention of yellowtail and widow rockfish is allowed > 20 fm in July.

- d/ When lingcod is open, retention is prohibited seaward of line drawn from Queets River ($47^{\circ}31.70^{\circ}$ N. Lat. $124^{\circ}45.00^{\circ}$ W. Lon.) to Leadbetter Point (46° 38.17' N. Lat. $124^{\circ}30.00^{\circ}$ W. Lon.), except on days open to the primary halibut fishery and, June 1-15 and September 1-30.
- e/ Retention of flatfish, sablefish, Pacific cod, yellowtail rockfish, widow rockfish, canary rockfish, redstriped rockfish, greenstriped rockfish, silvergray rockfish, chilipepper, bocaccio, and blue/deacon rockfish allowed during the all-depth Pacific halibut fishery. Lingcod retention is only allowed north of the WA-OR border with halibut on board.
- f/ Retention of lingcod is prohibited seaward of a line drawn from Leadbetter Point (46° 38.17' N. Lat. $124^{\circ}21.00'$ W. Lon.) to 46° 33.00' N. Lat. $124^{\circ}21.00'$ W. Lon. year round except lingcod retention is allowed from June 1 June 15 and Sept 1 Sept 30.

c/ From May 1 through May 31 lingcod retention prohibited > 30 fathoms except on days that the primary halibut season is open.

3. Red snapper slot limit or maximum size limit

- October 2021 Snapper Grouper AP Discussions:
 - O Slot limit does not address discards outside of the mini-season.
 - Slot limit or maximum size limit creates discards of fish outside of the slot.
 Efforts should be geared toward reducing discards.
 - o Size limit can create additional handling (can affect release survival).
 - o A slot limit based on weight or a max weight trip limit (for recreational) could be considered.
- Red snapper are the most commonly released snapper grouper species, and removals due to release mortality outnumber removals due to landings.
- Currently, there is no minimum size limit for red snapper in the South Atlantic during the open seasons.
- Minimum size limits can improve survival of smaller fish to mature sizes/ages.
- Maximum size limits can discourage high-grading improve survival of large females that exceed the maximum size limit, and improve or maintain stock productivity through greater abundance of large, spawning females.
- An application providing an overview of the red snapper fishery, including management history, landings, and assessment information, has been developed and can be found here: https://safmc-shinyapps.shinyapps.io/SA FisheryDataRedSnapper/

4. Other release mortality-related discussions/amendments

- October 2021 Snapper Grouper AP Discussions:
 - The AP continues to advocate for a federal recreational snapper grouper license or permit and reporting mechanisms as steps toward better identifying recreational effort and catch.
 - The AP also recommends continued public outreach and education, especially for the recreational fishery, on best fishing practices that can minimize regulatory releases and maximize release survival.
 - The AP also discussed the issue of shark depredation impacting survival of released snapper grouper species. AP members were interested in gathering any information necessary to assist in management actions to reduce depredation events.
- Regulatory Amendment 4 (1992): Allowed for the retention of incidentally caught fish on commercial black sea bass trips.
- Amendment 46 (postponed): Recreational permits and reporting; workgroup most recently convened in December 2021.

Committee Action:

PROVIDE GUIDANCE ON FURTHER DEVELOPMENT OF A FRAMEWORK AMENDMENT TO REDUCE SNAPPER GROUPER DEAD DISCARDS.

Appendix 1. Theoretical adaptive management for the Snapper Grouper Fishery from discussion of Snapper Grouper Amendment 43.

Red Snapper Adaptive Management for Snapper Grouper Fishing Limited Snapper Grouper Fishing Season 100 feet? >100-feet = < 100-feet = **Higher discard mortality** Lower discard mortality Fishing less than 100-feet - Options SHORT RED SNAPPER OPEN SEASON - OPTIONS Fishing greater than 100-feet - Options 1-month season (Differ by state/region?) PRIVATE RECREATIONAL FISHERMEN* PRIVATE RECREATIONAL FISHERMEN* Low Bag/Trip Limit (1/person; 2-3/vessel?) Allowed to Fish for Snapper Grouper Species Shoreward of 100-feet Only Allowed to Fish for Snapper Grouper Species in Greater Than Possible Size Limit? Year-Round With Conditions: 100-feet **During Red Snapper Open Season** With Conditions: Fish Within Annual Catch Limits and Size and Bag Limits Require Use of Descending Devices in > 100-feet Fish Within Annual Catch Limits and Size and Bag Limits No Red Snapper Retention Except During Short Open Season Retain Red Snapper and Other Species within Bag Limits FOR-HIRE FISHERMEN Catch & Release Allowed After Any ACL Closure (Since Mortality is Lower) *Required Electronic Permit & Electronic Logbook Reporting *Required Electronic Permit & Electronic Logbook Reporting Limited Access Fishery (Better Catch Data, Length of Discards, & Depth of Released Fish) (Better Catch Data, Length of Discards, & Depth of Released Fish) (Cap on # of Headboats &# of Charterboats) Required to Use Descending Device NOTE: Pilot project during 2017 to design the reporting system in partnership with SAFMC, NMFS, Allowed to Fish for Snapper Grouper Species in ACCSP, and the Snook and Gamefish Foundation; Electronic reporting will contribute better data All Depths (Longer Fishing Season) With Conditions: Fish Within Annual Catch Limits and Size and Bag Limits Open Open FOR-HIRE FISHERMEN **FOR-HIRE FISHERMEN** No Red Snapper Retention Except During Short VS. VS. Open Access Fishery **Open Access Fishery** Open Season Limited Limited (No limit on # of Headboats & # of Charterboats) (No limit on # of Headboats & # of Charterboats) Longer Fishing Season in Deeper Water Access Access Allowed to Fish for Snapper Grouper Species Shoreward of 100-feet Only Allowed to Fish for Snapper Grouper Species in Greater Than Because of Cap on Effort Year-Round With Conditions: 100-feet **During Red Snapper Open Season** With Conditions: Required to Use Descending Device in > 100-feet Fish Within Annual Catch Limits and Size and Bag Limits Fish Within Annual Catch Limits and Size and Bag Limits COMMERCIAL FISHERMEN Retain Red Snapper and Other Species within Bag Limits No Red Snapper Retention Except During Short Open Season Allowed to Fish for Snapper Grouper Species in All Depths Required to Use Descending Device Catch & Release Allowed After Any ACL Closure With Conditions: (Since Mortality is Lower) Fish Within ACLs and Size and Trip Limits No Red Snapper Retention Except During Short Open Season Required to Use Descending Device in > 100-feet February 2017